

REMARKS

This application has been reviewed further in light of the Office Action dated March 17, 2008. Claims 1-17, 51-58, and 72-101 remain pending in this application. Claims 1, 5, 51, 53, 72, 76, 77, 82, and 84 are in independent form. Claims 5-9 and 53 stand allowed. Favorable reconsideration is requested.

REQUEST FOR WITHDRAWAL OF FINALITY OF OFFICE ACTION

Applicants petition the Commissioner to withdraw the finality of the Office Action dated March 17, 2008. The Office Action, the second action issued after the filing of the Request for Continued Examination (RCE) dated September 21, 2007, should not have been made final in view of the fact that it raised a new ground of rejection neither necessitated by an amendment by Applicants, nor based on information submitted in an information disclosure statement filed during the period set forth in 37 C.F.R. 1.97(c). *See* MPEP § 706.07(a).

In the first Office Action (dated October 5, 2007) issued after the RCE's filing, the claims then under consideration were rejected, based at least in part, on U.S. Patent No. 6,477,288 (*Sato*). The grounds cited by that Office Action, appeared on page 3 thereof, as follows:

. . . the first terminal (penultimate circle from top of switch 13 in Figure 5A) and the second terminal (uppermost circle from top of switch 13 in Figure 5A) of said first switch are coupled through first plural optical fibers forming first communication paths (reference number 5 in Figure 5A with fiber 5 forming a loop as in Figure 16 using a plurality of fiber segments that form the first communication paths) and second plural optical fibers forming second communication paths (reference numeral 7 in Figure 5A

with fiber 7 forming a loop as in Figure 16 using a plurality of fiber segments that form the second communication paths), respectively, to a first, adjacent one of the nodes (e.g. nodes to the left of the node of Figure 5A) . . .

(Emphasis added.)

As pointed out on the Remarks section of the Request For Reconsideration filed January 7, 2008, the apparent grounds for the rejection in the October 5, 2007 Office Action are that the *single* network fiber element 5 of *Sato*'s Fig. 5A actually consists of *plural* fibers when taken as a ring configuration in view of *Sato*'s Fig. 16, and the *single* network fiber element 7 of Fig. 5A actually consists of *plural* fibers when taken as a ring configuration in view of Fig. 16.

However, the outstanding, second Office Action now has taken an entirely different position, namely that:

each node 'N' in Figure 16 having the structure shown in Figure 5A has within itself at least four first optical fibers, i.e. fiber 5 at the clockwise input to switch 13, fiber 26 at the clockwise output from switch 13, fiber 28 at the clockwise input to switch 14, and fiber 5 at the clockwise output to switch 14, that form first communication paths. Expanding this interpretation for every node shown in Figure 16, it becomes apparent that each node is coupled to every other node via at least four communication paths, i.e. two clockwise and two counter-clockwise paths, each of which is comprised of a plurality of fibers connected together at switching elements within the nodes as shown in Figure 5A, thus resulting in first optical fibers, plural other first optical fibers, plural second optical fibers, and plural other second optical fibers

(See the paragraph bridging pages 7-8 of the March 17, 2008 Office Action.

In other words, the grounds for rejection set forth in the March 17, 2008 Office Action are that the components 5 (at an input to switch 13), 26, 28, and 5 (at an output of switch 14) form communication paths that, when taken in view of Fig. 16 of

Sato, result in “plural first optical fibers, plural other first optical fibers, plural second optical fibers, and plural other second optical fibers”.

As can be seen, this ground of rejection differs from that relied on in the October 5, 2007 Office Action in that the new ground of rejection now relies on internal components 26 and 28 in the node N, instead of the components 5 and 7, for example. (*See also* section 8 of the October 5, 2007 Office Action, citing “the fibers between each node “ as being first and second fibers). Indeed, page 8 of the March 17, 2008 Office Action concedes that “applicant’s argument [in the Request For Reconsideration filed January 7, 2008] that the examiner appears to have interpreted each single *fiber* of Sato as a plurality of fiber elements is moot since ... the examiner [now] contends that each single *path or loop* in Sato is actually comprised of a plurality of optical fibers.” (Emphasis added).

As pointed out above, according to MPEP § 706.07(a), a second office action on the merits should not be made final if it raises a new ground of rejection neither necessitated by an amendment by Applicants, nor based on information submitted in an information disclosure statement filed during the period set forth in 37 C.F.R. 1.97(c). Since the March 17, 2008 Office Action was made “final” despite the fact that neither of those exceptions apply, that Office Action should not have been made final. Accordingly, Applicants petition that the Office withdraw the finality of that Office Action.

Since the error requested to be corrected by this paper is not the fault of the Applicants, no fee is believed due. If, for some reason, a fee is deemed due for this petition, such fee may be charged to Deposit Account 06-1205.

THE REJECTIONS SET FORTH IN THE OFFICE ACTION

Claims 1-4, 13, 14, 17, 51, 52, 56, 72-85, 87, 91, 95 and 99 were rejected under 35 U.S.C. 102(e) as being anticipated by U.S. Patent No. 6,477,288 (*Sato*). Claims 10-12, 54, 55, 86, 89, 90, 93, 94, 96, 98, and 100 were rejected under 35 U.S.C. 103(a) as being unpatentable over *Sato*. Claims 15, 16, 57, 58, and 101 were rejected under 35 U.S.C. 103(a) as being unpatentable over *Sato* in view of U.S. Patent No. 5,986,783 (*Sharma et al.*).

According to Claim 1, a first switch of a node is coupled through plural first optical fibers and plural second optical fibers to a first, adjacent node, and a second switch of the node is coupled through plural other first optical fibers and plural other second optical fibers to a second, adjacent node. Also, the first optical fibers, the second optical fibers, the other first optical fibers, and the other second optical fibers, are each, at least in part, external to the node. *See*, for example Figs. 2 and 3 ^{1/}, including, for example, fibers 70a, 70b, 72a, and 72b coupled to switch 25 and fibers 80a, 80b, 82a, and 82b coupled to switch 27 in Fig. 3

The Office Action states on page 7 that:

“Applicant’s arguments filed 9/21/07 have been fully considered but they are not persuasive. As noted in the office action, Sato teaches the plural first optical fibers that form the first communication path in that the first communication path is actually composed of a plurality of first fiber segment (e.g. the fibers between each node) that when taken as a ring anticipates the claimed plural first optical fibers forming first communication paths.”

^{1/} It should be understood, of course, that Figs. 2 and 3 are referred to herein for illustrative purposes only, and the claims should not be construed as being limited only to the embodiment(s) depicted.

Also, as pointed out above, the paragraph bridging pages 7-8 of the Office Action appears to take the position that the components 5 (at input to switch 13), 26, 28, and 5 (at output of switch 14) form communication paths that, when taken in view of Fig. 16 of *Sato*, result in “plural first optical fibers, plural other first optical fibers, plural second optical fibers, and plural other second optical fibers”, and thus “each single path or loop in *Sato* is actually comprised of a plurality of optical fibers.”

However, as can be seen in Figure 5A of *Sato*, at least two of the *Sato* components relied on by the Office Action, namely, components 26 and 28, are internal to the node N. Thus, even if those components were deemed to be optical fibers as alleged in the Office Action, they are included within the node N, and do not extend externally to the node N. Nothing has been found in *Sato* that is understood to teach or suggest a network as set forth in Claim 1, wherein first optical fibers, second optical fibers, other first optical fibers, and other second optical fibers, are each, at least in part, external to the node and coupled in the manner recited in the claim. Therefore, that claim is believed to be clearly patentable over *Sato*, and thus withdrawal of the Section 102(e) rejection of Claim 1 is requested.

Independent Claim 51 is a node claim having features similar in many relevant respects to those of Claim 1 emphasized above, and also is believed to be clearly patentable over *Sato* for the same reasons as those set forth above with respect to Claim 1.

Independent Claim 72, as amended, recites, in part, that plural first optical fibers form at least two working paths and plural second optical fibers form at least two protect paths and that at least one of the switches of at least one of the nodes is coupled to at least one of the switches of at least one other of the nodes through the plural first optical

fibers and the plural second optical fibers that extend, at least in part, external to at least one of the nodes.

Independent Claim 76 recites, in part, that least one switch is coupled to plural first optical fibers and plural second optical fibers, and the plural first optical fibers and the plural second optical fibers are external to the line node.

Independent Claim 77 recites, in part, that at least one switch of at least one node is coupled to at least one switch of at least one other node through plural first optical fibers and the plural second optical fibers, and the plural first optical fibers and the plural second optical fibers are external to the at least one node.

Independent Claims 82 and 84 recite that at least one of the switches is coupled to plural first optical fibers forming plural working paths and plural second optical fibers forming plural protect paths. The plural first optical fibers and the plural second optical fibers are external to the line node.

As pointed out above, in Fig. 5A of *Sato*, the components 26 and 28, are internal to the node N, and do not extend external to the node N. Nothing has been found, or pointed out in *Sato* that would teach or suggest the above-recited features of Claim 72, 76, 77, 82, and 84. Accordingly, those claims are believed to be clearly patentable over *Sato*.

A review of *Sharma et al.* has failed to reveal anything which is understood to remedy the above-described deficiencies of *Sato* against the independent claims herein. Accordingly, those claims are believed to be patentable over both of those references.

The other pending claims in this application are each dependent from one or another of the independent claims discussed above and also are believed to be patentable over the art relied on in the Office Action for the same reasons as are those independent

claims. Since each dependent claim is also deemed to define an additional aspect of the invention, however, the individual reconsideration of the patentability of each on its own merits is respectfully requested.

CONCLUSION

For the reasons given above, the finality of the Office Action is believed to be improper, and thus its withdrawal is respectfully requested, as is entry of the present Amendment as a matter of right. In any event, however, entry of this Amendment, as an earnest effort to advance prosecution and reduce the number of issues, is respectfully requested. Should the Examiner believe that issues remain outstanding, he is respectfully requested to contact Applicants' undersigned attorney in an effort to resolve such issues and advance the case to issue.

In view of the foregoing amendments and remarks, Applicants respectfully request withdrawal of the finality of the Office Action, entry of the present Amendment, as well as favorable reconsideration and early passage to issue of the present application.

Applicants' undersigned attorney may be reached in our New York office by telephone at (212) 218-2100. All correspondence should continue to be directed to our below listed address.

Respectfully submitted,

/Frank A. DeLucia/
Frank A. DeLucia
Attorney for Applicants
Registration No.: 42,476

FITZPATRICK, CELLA, HARPER & SCINTO
30 Rockefeller Plaza
New York, New York 10112-3801
Facsimile: (212) 218-2200